

CLAIMS

What is claimed is:

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1. An apparatus for guiding a flexible hole-drilling instrument to an obstructed area of a surface, comprising:
10 a body;
 an inlet aperture for inserting the flexible hole-drilling instrument;
 an exit aperture; and
 a raceway extending between said inlet and exit apertures,
15 wherein said raceway has a cross sectional area and is
 nonlinear.

2. The apparatus of claim 1 further comprising:

20 a face substantially conforming to the obstructed area of the surface.

3. The apparatus of claim 2 wherein:

25 said exit aperture is located on said substantially conforming face.

4. The apparatus of claim 3 further comprising:

30 a locating feature for accurately locating said exit aperture in relation to the obstructed area of the surface.

5. The apparatus of claim 4 wherein:

35 said raceway cross sectional area is circular.

6. The apparatus of claim 5 wherein:

40 said raceway is coated with an electrical insulating material.

7. A method for drilling a hole in an obstructed area of a surface, comprising:

- (a) locating an apparatus for guiding a flexible hole-drilling instrument in proximity to the obstructed area of the surface;
- (b) guiding said instrument with said apparatus so that said instrument follows a nonlinear path; and
- (c) drilling a hole into the obstructed area of the surface.

8. The method of claim 7 wherein the flexible hole-drilling instrument is an electrodisscharge machining electrode.

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